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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/679,804	10/06/2003	Teresa Joanne Hunkeler	I-2-0388.1US	3395
24374 7590 04/20/2007 VOLPE AND KOENIG, P.C. DEPT. ICC UNITED PLAZA, SUITE 1600 30 SOUTH 17TH STREET PHILADELPHIA, PA 19103			EXAMINER HAILU, KIBROM T	
			ART UNIT 2616	PAPER NUMBER
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		04/20/2007	PAPER	

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

# Office Action Summary

Application No.

10/679,804

Applicant(s)

HUNKELER ET AL.

Examiner

Kibrom T. Hailu

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 06 October 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-23 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-23 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 06 October 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-23 are rejected under 35 U.S.C. 102(e) as being anticipated by Reynolds et al. (US Patent 7,149,524).

**Regarding claim 1,** Reynolds discloses a wireless transmit/receive unit (WTRU) configured for seamless operation across various types of wireless communication systems (fig. 1; col. 2, lines 37-40), comprising: at least one application for performing a wireless service wherein the application is configured to translate quality of service requirements across various types of wireless communication systems (col. 5, lines 50-55; col. 3, lines 55-64; col. 1, lines 13-21, explains handover between different networks based on the quality of service while the user is actively engaged in a communication session. Obviously, a better quality of service is used to maintain the call because Reynolds teaches the call is not dropped when the user moves from one network system to another or when handing over between the network systems GSM, W-CDMA and WLAN); and at least one bearer for transmitting user-information signals between user-network interfaces (see fig. 1; col. 2, lines 14-30, illustrates the mobile station 8 is communicate with the communication systems or networks GSM, W-CDMA and WLAN via the paths of nodes 3, 5 and 7).

**Regarding claim 2,** Reynolds discloses the application is configured to receive incoming quality of service requirements specified according to one type of wireless communication system and translate the requirements to output the requirements according to another type of wireless communication system (col. 5, lines 36-41).

**Regarding claim 3,** Reynolds further discloses including a plurality of bearers, wherein the number of bearers corresponds to the number of wireless communication systems that the application is capable of translating (fig. 1; col. 2, lines 28-30, explains the mobile station 8 communicates to the respective networks GSM 2, W-CDMA 4 and WLAN 6 through the nodes 3, 5, and 7 and respective transmission paths, which are also called bearers and are known in the art).

**Regarding claim 4,** Reynolds discloses the WTRU hands over from a first cellular type wireless communication system to a second cellular type wireless communication system and the application translates quality of service requirements of the first system to that of the second system in order to continue a service initiated in the first system (col. 1, lines 39-46; col. 5, lines 36-41; col. 5, lines 50-55).

**Regarding claim 5,** Reynolds discloses the first cellular type wireless communication system is a UMTS system and the second cellular type wireless communication system is a CDMA 2000 system (fig. 1; col. 1, lines 43-46; col. 2, lines 14-25).

**Regarding claim 6,** Reynolds discloses the WTRU hands over from a cellular type wireless communication system to a wireless local area network (WLAN) type wireless communication system and the application translates quality of service requirements of the cellular type system to that of the WLAN type system in order to continue a service initiated in

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the cellular system (fig. 1; col. 2, lines 14-25; col. 1, lines 39-46; col. 5, lines 36-41; col. 5, lines 50-55).

**Regarding claim 7**, Reynolds discloses the WTRU hands over from a wireless local area network (WLAN) type wireless communication system to a cellular type wireless communication system and the application translates quality of service requirements of the WLAN type system to that of the cellular type system in order to continue a service initiated in the WLAN system (fig. 1; col. 2, lines 14-25; col. 1, lines 39-46; col. 5, lines 36-41; col. 5, lines 50-55).

**Regarding claim 8**, Reynolds discloses a wireless transmit/receive unit (WTRU) configured for seamless operation across various types of wireless communication systems (fig. 1; col. 2, lines 37-40), comprising: at least one application for performing a wireless service (col. 1, lines 27-39); at least one bearer for transmitting user-information signals between user-network interfaces (see fig. 1; col. 2, lines 14-30, illustrates the mobile station 8 is communicate with the communication systems or networks GSM, W-CDMA and WLAN via the paths of nodes 3, 5 and 7); and at least one translator (handover manager 10) between the application and the bearer for translating quality of service requirements whereby sessions established in a first wireless communication system may continue when the WTRU hands over to other various types of wireless communication systems (col. 5, lines 50-55; col. 3, lines 55-64; col. 1, lines 13-21, explains handover between different networks by the handover manager 10 based on the quality of service while the user is actively engaged in a communication session. Obviously, a better quality of service is used to maintain the call because Reynolds teaches the call is not

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dropped when the user moves from one network system to another or when handing over between the network systems GSM, W-CDMA and WLAN).

**Regarding claim 9**, Reynolds discloses the translator (handover manager 10) is configured to receive incoming quality of service requirements specified according to one type of wireless communication system and translate the requirements to output the requirements according to another type of wireless communication system (col. 5, lines 34-41).

**Regarding claim 10**, Reynold discloses incoming quality of service requirements are received and are routed to an appropriate translator and bearer to continue operation of the application while the WTRU hands over between various types of wireless communication systems (col. 2, lines 14-45).

**Regarding claim 11**, Reynold discloses the WTRU hands over from a first cellular type wireless communication system to a second cellular type wireless communication system and the translator translates quality of service requirements of the first system to that of the second system in order to continue a service initiated in the first system (col. 1, lines 39-46; col. 5, lines 34-41; col. 5, lines 50-55).

**Regarding claim 12**, Reynolds discloses the translated quality of service requirements are transmitted over a bearer service corresponding to the second system (fig. 1; col. 2, lines 28-37).

**Regarding claim 13**, Reynolds discloses the first cellular type wireless communication system is a UMTS system and the second cellular type wireless communication system is a CDMA 2000 system (fig. 1; col. 1, lines 43-46; col. 2, lines 14-25).

**Regarding claim 14**, Reynolds discloses the WTRU hands over from a cellular type wireless communication system to a wireless local area network (WLAN) type wireless communication system and the translator translates quality of service requirements of the cellular type system to that of the WLAN type system in order to continue a service initiated in the cellular system (fig. 1; col. 2, lines 14-25; col. 1, lines 39-46; col. 5, lines 36-41; col. 5, lines 50-55).

**Regarding claim 15**, Reynolds discloses the translated quality of service requirements are transmitted over a bearer service corresponding to the WLAN type system (fig. 1; col. 2, lines 28-37).

**Regarding claim 16**, Reynolds discloses the WTRU hands over from a wireless local area network (WLAN) type wireless communication system to a cellular type wireless communication system and the application translates quality of service requirements of the WLAN type system to that of the cellular type system in order to continue a service initiated in the WLAN system (fig. 1; col. 2, lines 14-25; col. 1, lines 39-46; col. 5, lines 36-41; col. 5, lines 50-55).

**Regarding claim 17**, Reynolds discloses the translated quality of service requirements are transmitted over a bearer service corresponding to the cellular type system (fig. 1; col. 2, lines 28-37).

**Regarding claim 18**, Reynolds discloses a wireless communication system (fig. 1; col. 2, lines 14-18), comprising: at least one interfacing device through which wireless transmit/receive units (WTRUs) may interface with the wireless communication system (fig. 1; col. 2, lines col. 28-30, 40-45, the nodes 3, 5 and 7 are the interfacing devices through which the user equipment

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or mobile stations communicate with the plurality of radio access domains GSM, W-CDMA and WLAN); and means (handover manager 10, and nodes 3, 5 and 5) for receiving quality of service requirements from a WTRU requesting handover to the wireless communication system wherein the quality of service requirements are specified according to a different type of wireless communication system from which the WTRU is requesting handover from and translating the quality of service requirements to continue a service initiated in the system from which the WTRU is requesting handover from (col. 5, line 34- col. 6, line 3; col. 7, lines 1-24; col. 8, lines 31-38; col. 3, line 66-col. 4, line 27).

**Regarding claim 19,** Reynolds discloses the wireless communication system is a cellular type wireless communication system and the translation of quality of service requirements is performed in the core network (col. 2, line 66-col. 3, line 6).

**Regarding claim 20,** Reynolds discloses the wireless communication system is a wireless local area network (WLAN) type wireless communication system and the translation of quality of service requirements is performed at an access point (fig. 1 and 3; col. 5, lines 34-55, one out of the plurality of network systems is WLAN and the handover manager 10 performs the handover function based on the quality of the services of the respective network access domains or systems).

**Regarding claim 21,** Reynold discloses the translation of quality of service requirements is performed at an access router (col. 5, lines 34-55, the handover based on the quality of services is performed by the handover manager 10).

**Regarding claim 22,** Reynolds discloses a method for providing seamless handover between various types of wireless communication systems (col. 2, lines 37-40; claim 1),

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comprising the steps of : initiating an application in a wireless transmit/receive unit (WTRU) in a first type of wireless communication system (col. 3, lines 55-64; fig. 1, the user wireless transmit/receive unit or the mobile station initiates communication in one of the plurality of network access domains GSM, W-CDMA and WLAN); requesting handover of the WTRU from the first system to a second type of wireless communication system (col. 1, lines 36-46, illustrates a user initiates communication session using one of the plurality of the networks and handover to another while maintaining the call or communication); translating quality of service requirements from the specifications of the first system to the specifications of the second system; handing over the WTRU to the second system; and continuing in the second system the application that was initiated in the first system, wherein the application is continued with the quality of service requirements specified according to the specifications of the second system (fig. 1; col. 5, lines 50-55; col. 3, lines 55-64; col. 1, lines 13-21, explains handover between different networks based on the quality of service while the user is actively engaged in a communication session or the without stopping the first call. Obviously, a better quality of service is used to maintain the call because Reynolds teaches the call is not dropped when the user moves from one network system to another or when handing over between the network systems GSM, W-CDMA and WLAN. That is, since Reynolds teaches handovers between the above network systems is performed while the user engaged in the initial communication and each of the network systems has different quality of service, translation of translation from one network to another).

**Regarding claim 23,** Reynolds discloses the application is continued in the second system using a bearer that corresponds to the second system (fig. 1; col. 2, lines 28-30, illustrates

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that the mobile station 8 is communicated to the respective networks GSM, W-CDMA and WLAN through the nodes 3, 5, and 7 and respective transmission paths, which are also called bearers and are known in the art).

*Conclusion*

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kibrom T. Hailu whose telephone number is (571)270-1209. The examiner can normally be reached on Monday-Thursday 8:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ricky Q. Ngo can be reached on (571)272-3139. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Kibrom T. Hailu  
04/11/07

  
RICKY Q. NGO

SUPERVISORY PATENT EXAMINER